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### 1 [Handling irreducible loops: optimized node splitting versus DJ-graphs](#)



Sebastian Unger, Frank Mueller

 July 2002 **ACM Transactions on Programming Languages and Systems (TOPLAS)**,  
Volume 24 Issue 4

Publisher: ACM Press

 Full text available: [pdf\(386.11 KB\)](#) Additional Information: [full citation](#), [abstract](#), [references](#), [index terms](#)

This paper addresses the question of how to handle irreducible regions during optimization, which has become even more relevant for contemporary processors since recent VLIW-like architectures highly rely on instruction scheduling. The contributions of this paper are twofold. First, a method of optimized node splitting to transform irreducible regions of control flow into reducible regions is formally defined and its correctness is shown. This method is superior to approaches previously published ...

**Keywords:** Code optimization, compilation, control flow graphs, instruction-level parallelism, irreducible flowgraphs, loops, node splitting, reducible flowgraphs

### 2 [Nesting of reducible and irreducible loops](#)



Paul Havlak

 July 1997 **ACM Transactions on Programming Languages and Systems (TOPLAS)**,  
Volume 19 Issue 4

Publisher: ACM Press

 Full text available: [pdf\(180.13 KB\)](#) Additional Information: [full citation](#), [abstract](#), [references](#), [citations](#), [index terms](#)

Recognizing and transforming loops are essential steps in any attempt to improve the running time of a program. Aggressive restructuring techniques have been developed for single-entry (reducible) loops, but restructurings and the dataflow and dependence analysis they rely on often give up in the presence of multientry (irreducible) loops. Thus one irreducible loop can prevent the improvement of all loops in a procedure. This article gives an algorithm to build a loop nesting tree for a procedure ...

**Keywords:** reducible loops, strongly-connected regions

### 3 [Identifying loops using DJ graphs](#)



Vugranam C. Sreedhar, Guang R. Gao, Yong-Fong Lee

 November 1996 **ACM Transactions on Programming Languages and Systems**



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## » Key

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IEE JNL IEE Journal or Magazine

IEEE CNF IEEE Conference Proceeding

IEE CNF IEE Conference Proceeding

IEEE STD IEEE Standard

## Select Article Information

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 Percus, J.;  
 Circuit Theory, IRE Transactions on  
 Volume 2, Issue 2, Jun 1955 Page(s):117 - 127  
[AbstractPlus](#) | Full Text: [PDF](#)(1216 KB) IEEE JNL
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 Zhao, W.; Bryant, B.R.; Cao, F.; Kamal Bhattacharya; Hauser, R.;  
 Services Computing, 2005 IEEE International Conference on  
 Volume 1, 11-15 July 2005 Page(s):173 - 180 vol.1  
 Digital Object Identifier 10.1109/SCC.2005.102  
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 Zhang, F.; D'Hollander, E.H.;  
 Software Engineering, IEEE Transactions on  
 Volume 30, Issue 4, April 2004 Page(s):231 - 245  
 Digital Object Identifier 10.1109/TSE.2004.1274043  
[AbstractPlus](#) | [References](#) | Full Text: [PDF](#)(1838 KB) IEEE JNL
- ☐ 4. **An efficient online path profiling framework for Java just-in-time compiler**  
 Yasue, T.; Suganuma, T.; Komatsu, H.; Nakatani, T.;  
 Parallel Architectures and Compilation Techniques, 2003. PACT 2003. Proceed  
 International Conference on  
 27 Sept.-1 Oct. 2003 Page(s):148 - 158  
 Digital Object Identifier 10.1109/PACT.2003.1238011  
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 Dean, A.G.; Shen, J.P.;  
 Real-Time Systems Symposium, 1998. Proceedings., The 19th IEEE  
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- ☐ 6. **Hardware to software migration with real-time thread integration**  
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